Application No. 09/990,346
Amdt. Dated October 22, 2003
Reply to Office Action of July 24, 2003
Docket No.4001-1084

## REMARKS

The specification and drawings have been amended to make editorial changes therein, bearing in mind the criticisms in the Official Action, to place the application in condition for allowance at the time of the next Official Action.

A Request to Correct Inventorship is being filed concurrently herewith.

Claims 1-37 were rejected under §112, second paragraph, and have been replaced with new claims that are believed to be proper as to form. Reconsideration and withdrawal of the rejection are respectfully requested.

Claims 1-37 were rejected as unpatentable over SUDO et al. 5,144,446 in view of TAN et al. 6,381,357. Reconsideration and withdrawal of the rejection are respectfully requested in view of the new claims.

The new independent claims are based, at least in part, on original claims 1, 5, 9, 11 and 15-16. Support for the new claims is found in the specification at page 7, line 13 through page 8, line 5; page 9, lines 23-37; page 12, lines 23-35; and page 16, line 18 through page 17, line 20, for example.

The new claims define a two-step image correction process. For example, method claim 38 includes the steps of carrying out a first correction in which already known defects are corrected using an old defect map, analyzing the results of

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the first correction process to create a new defect map that describes new defects not found in the old defect map, and carrying out a second correction in which the new defects are corrected using the new defect map. Device claim 55 is similar and defines components that carry out these steps. Claim 65 uses alternative claim language to define the same invention, and includes the steps of providing an old defect map showing existing defective pixels, first correcting an image by correcting the existing defective pixels with reference to the old defect map, analyzing the first corrected image to find new defective pixels, generating a new defect map showing the new defective pixels, and second correcting the analyzed image by correcting the new defective pixels with reference to the new defect map.

The applied references have been carefully considered and it is believed that they do not disclose or suggest the two-step correction process of the new claims. SUDO et al. disclose a solid-state imager with a self-test mode and TAN et al. disclose using defect maps in the context of image sensors. TAN et al. suggest that an old defect map may be stored as an offline defect map (column 3, lines 49-51), but the reference lacks a further suggestion to perform the two-step correction process now claimed. Note that while TAN et al. disclose an iterative process in Figure 1, the iteration is pixel-by-pixel and does not

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include a first correction that is based on the old defect map, an analysis of the corrected image to find new defective pixels, generation of a new defect map showing the new defective pixels, and a second correction that is based on the new defect map.

In view of the present amendment and the foregoing remarks, it is believed that the present application has been placed in condition for allowance. Reconsideration and allowance are respectfully requested.

The Commissioner is hereby authorized in this, concurrent, and future replies, to charge payment or credit any overpayment to Deposit Account No. 25-0120 for any additional fees required under 37 C.F.R. § 1.16 or under 37 C.F.R. § 1.17.

Respectfully submitted,

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## Appendix

- three Replacement drawing sheets (FIGS. 1-3).